



RECEIVED
10-1-02

ANALYTICAL RESULTS

Prepared for:

Sun: SECOR International, Inc
Suite 200
102 Pickering Way
Exton PA 19341
484-875-9075

Prepared by:

Lancaster Laboratories
2425 New Holland Pike
Lancaster, PA 17605-2425

SAMPLE GROUP

The sample group for this submittal is 823334. Samples arrived at the laboratory on Wednesday, September 18, 2002. The PO# for this group is 1037.

Client Description

MW-1(1-1.5) Grab Soil Sample
MW-2(1-1.5) Grab Soil Sample
MW-3(1-1.5) Grab Soil Sample
Trip Blank Methanol Sample

Lancaster Labs Number

3901264
3901265
3901266
3901267

1 COPY TO

Sun: SECOR International, Inc

Attn: Mr. Steve Bagett

Questions? Contact your Client Services Representative
Sandra L Patton at (717) 656-2300.

Respectfully Submitted,

Robert E. Mellinger
Sr. Chemist/Coordinator



Lancaster Laboratories, Inc.
2425 New Holland Pike
PO Box 12425
Lancaster, PA 17605-2425
717-656-2300 Fax: 717-656-2681



Lancaster Laboratories Sample No. SW 3901264

Collected: 09/17/2002 10:40 by SM

Account Number: 11183

Submitted: 09/18/2002 15:30
 Reported: 09/25/2002 at 12:28
 Discard: 10/03/2002
 MW-1(1-1.5) Grab Soil Sample
 SUNOCO: AST 797

Sun: SECOR International, Inc
 Suite 200
 102 Pickering Way
 Exton PA 19341

1115-

CAT No.	Analysis Name	CAS Number	Dry Result	Dry Limit of Quantitation	Units	Dilution Factor
00111	Moisture	n.a.	22.7	0.50	% by wt.	1
	"Moisture" represents the loss in weight of the sample after oven drying at 103 - 105 degrees Celsius. The result reported above is on an as-received basis.					
02304	UST-Unleaded Soils by 8260B					
02016	Methyl t-butyl ether	1634-04-4	< 310.	310.	ug/kg	48.26
05460	Benzene	71-43-2	2,600.	310.	ug/kg	48.26
05466	Toluene	108-88-3	1,600.	310.	ug/kg	48.26
05474	Ethylbenzene	100-41-4	3,700.	310.	ug/kg	48.26
05479	Isopropylbenzene	98-82-8	60,000.	1,600.	ug/kg	241.31
05498	Naphthalene	91-20-3	1,800.	310.	ug/kg	48.26
06301	Xylene (Total)	1330-20-7	3,500.	310.	ug/kg	48.26

The analysis for volatiles was performed on a sample which was preserved in methanol. The reporting limits were adjusted appropriately.

Poor surrogate recoveries were observed for the GC/MS volatile fraction. The analysis was repeated and poor surrogate recoveries were again observed indicating a significant matrix effect.

00405 Field Preserved Methanol

The sample submitted for volatile organic analysis was preserved with methanol in the field.

Commonwealth of Pennsylvania Lab Certification No. 36-037

Laboratory Chronicle

CAT No.	Analysis Name	Method	Trial#	Analysis Date and Time	Analyst	Dilution Factor
00111	Moisture	EPA 160.3 modified	1	09/19/2002 08:32	Helen L Schaeffer	1
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/23/2002 17:32	Bryan J Polick	48.26
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/23/2002 19:55	Bryan J Polick	241.31



Lancaster Laboratories, Inc.
 2425 New Holland Pike
 PO Box 12425
 Lancaster, PA 17605-2425
 717-656-2300 Fax: 717-656-2681



Lancaster Laboratories Sample No. SW 3901265

Collected: 09/17/2002 08:00 by SM

Account Number: 11183

Submitted: 09/18/2002 15:30
 Reported: 09/25/2002 at 12:28
 Discard: 10/03/2002
 MW-2(1-1.5) Grab Soil Sample
 SUNOCO: AST 797

Sun: SECOR International, Inc
 Suite 200
 102 Pickering Way
 Exton PA 19341

2115-

CAT No.	Analysis Name	CAS Number	Dry Result	Dry Limit of Quantitation	Units	Dilution Factor
00111	Moisture	n.a.	27.4	0.50	% by wt.	1
"Moisture" represents the loss in weight of the sample after oven drying at 103 - 105 degrees Celsius. The result reported above is on an as-received basis.						
02304	UST-Unleaded Soils by 8260B					
02016	Methyl t-butyl ether	1634-04-4	< 330.	330.	ug/kg	47.53
05460	Benzene	71-43-2	6,500.	330.	ug/kg	47.53
05466	Toluene	108-88-3	< 330.	330.	ug/kg	47.53
05474	Ethylbenzene	100-41-4	520.	330.	ug/kg	47.53
05479	Isopropylbenzene	98-82-8	190,000.	3,300.	ug/kg	475.29
05498	Naphthalene	91-20-3	1,900.	330.	ug/kg	47.53
06301	Xylene (Total)	1330-20-7	860.	330.	ug/kg	47.53

The analysis for volatiles was performed on a sample which was preserved in methanol. The reporting limits were adjusted appropriately.

Poor surrogate recoveries were observed for the GC/MS volatile fraction. The analysis was repeated and poor surrogate recoveries were again observed indicating a significant matrix effect.

00405 Field Preserved Methanol

The sample submitted for volatile organic analysis was preserved with methanol in the field.

Commonwealth of Pennsylvania Lab Certification No. 36-037

Laboratory Chronicle

CAT No.	Analysis Name	Method	Trial#	Analysis Date and Time	Analyst	Dilution Factor
00111	Moisture	EPA 160.3 modified	1	09/19/2002 08:32	Helen L Schaeffer	1
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/23/2002 18:08	Bryan J Polick	47.53
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/23/2002 20:30	Bryan J Polick	475.29



Lancaster Laboratories, Inc.
 2425 New Holland Pike
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Lancaster Laboratories Sample No. SW 3901266

Collected: 09/16/2002 14:45 by SM

Account Number: 11183

Submitted: 09/18/2002 15:30
 Reported: 09/25/2002 at 12:28
 Discard: 10/03/2002
 MW-3 (1-1.5) Grab Soil Sample
 SUNOCO: AST 797

Sun: SECOR International, Inc
 Suite 200
 102 Pickering Way
 Exton PA 19341

31115

CAT No.	Analysis Name	CAS Number	Dry Result	Dry Limit of Quantitation	Units	Dilution Factor
00111	Moisture	n.a.	14.2	0.50	% by wt.	1
"Moisture" represents the loss in weight of the sample after oven drying at 103 - 105 degrees Celsius. The result reported above is on an as-received basis.						
02304	UST-Unleaded Soils by 8260B					
02016	Methyl t-butyl ether	1634-04-4	< 1,100.	1,100.	ug/kg	187.97
05460	Benzene	71-43-2	610,000.	11,000.	ug/kg	1879.7
05466	Toluene	108-88-3	300,000.	11,000.	ug/kg	1879.7
05474	Ethylbenzene	100-41-4	14,000.	1,100.	ug/kg	187.97
05479	Isopropylbenzene	98-82-8	270,000.	11,000.	ug/kg	1879.7
05498	Naphthalene	91-20-3	4,800.	1,100.	ug/kg	187.97
06301	Xylene (Total)	1330-20-7	67,000.	1,100.	ug/kg	187.97

The analysis for volatiles was performed on a sample which was preserved in methanol. The reporting limits were adjusted appropriately.

The reporting limits for the GC/MS volatile compounds were further raised because sample dilution was necessary to bring target compounds into the calibration range of the system.

Poor surrogate recoveries were observed for the GC/MS volatile fraction due to the dilution needed to perform the analysis.

00405 Field Preserved Methanol

The sample submitted for volatile organic analysis was preserved with methanol in the field.

Commonwealth of Pennsylvania Lab Certification No. 36-037

Laboratory Chronicle

CAT No.	Analysis Name	Method	Trial#	Analysis Date and Time	Analyst	Dilution Factor
00111	Moisture	EPA 160.3 modified	1	09/19/2002 08:32	Helen L Schaeffer	1
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/23/2002 16:57	Bryan J Polick	1879.7
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/23/2002 18:43	Bryan J Polick	187.97



Lancaster Laboratories, Inc.
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 Lancaster, PA 17605-2425
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Lancaster Laboratories Sample No. SW 3901266

Collected: 09/16/2002 14:45 by SM

Account Number: 11183

Submitted: 09/18/2002 15:30
Reported: 09/25/2002 at 12:28
Discard: 10/03/2002
MW-3 (1-1.5) Grab Soil Sample
SUNOCO: AST 797

Sun: SECOR International, Inc
Suite 200
102 Pickering Way
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31115



Lancaster Laboratories, Inc.
2425 New Holland Pike
PO Box 12425
Lancaster, PA 17605-2425
717-656-2300 Fax: 717-656-2681



Lancaster Laboratories Sample No. SW 3901267

Collected: n.a.

Account Number: 11183

Submitted: 09/18/2002 15:30
 Reported: 09/25/2002 at 12:28
 Discard: 10/03/2002
 Trip Blank Methanol Sample
 SUNOCO: AST 797

Sun: SECOR International, Inc
 Suite 200
 102 Pickering Way
 Exton PA 19341

METTB

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Limit of Quantitation	Units	Dilution Factor
02304	UST-Unleaded Soils by 8260B					
02016	Methyl t-butyl ether	1634-04-4	< 250.	250.	ug/kg	50
05460	Benzene	71-43-2	< 250.	250.	ug/kg	50
05466	Toluene	108-88-3	< 250.	250.	ug/kg	50
05474	Ethylbenzene	100-41-4	< 250.	250.	ug/kg	50
05479	Isopropylbenzene	98-82-8	< 250.	250.	ug/kg	50
05498	Naphthalene	91-20-3	< 250.	250.	ug/kg	50
06301	Xylene (Total)	1330-20-7	< 250.	250.	ug/kg	50

The analysis for volatiles was performed on a sample which was preserved in methanol. The reporting limits were adjusted appropriately.

00405 Field Preserved Methanol

The sample submitted for volatile organic analysis was preserved with methanol in the field.

Commonwealth of Pennsylvania Lab Certification No. 36-037

Laboratory Chronicle

CAT No.	Analysis Name	Method	Trial#	Analysis Date and Time	Analyst	Dilution Factor
02304	UST-Unleaded Soils by 8260B	SW-846 8260B	1	09/20/2002 22:52	Bryan J Polick	50



Lancaster Laboratories, Inc.
 2425 New Holland Pike
 PO Box 12425
 Lancaster, PA 17605-2425
 717-656-2300 Fax: 717-656-2681

Analysis Request / Environmental Services Chain of Custody



For Lancaster Laboratories use only

Acct. # 11183 Group# 823334 Sample # 3901264-67 **COC # 0003488**

Please print. Instructions on reverse side correspond with circled numbers.

1 Client: <u>SUNOCO / SECOR</u> Acct. #: _____ Project Name/#: <u>AST 797</u> PWSID #: _____ Project Manager: <u>STEVE BAGGETT</u> P.O. #: _____ Sampler: <u>SERGIO MORESCALCHI</u> Quote #: _____ Name of state where samples were collected: <u>PA</u>				Matrix Check if Applicable <input type="checkbox"/> Potable <input type="checkbox"/> NPDES <input type="checkbox"/> Other		5 Analyses Requested <u>BTEX, CUMENE, MTBE, NAPHTHALENE</u>										For Lab Use Only FSC: _____ SCR #: <u>1168634</u>																																																																																																																	
2 <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Sample Identification</th> <th>Date Collected</th> <th>Time Collected</th> <th>Grab</th> <th>Composite</th> <th>Soil</th> <th>Water</th> <th>Other</th> <th>Total # of Containers</th> <th>Remarks</th> </tr> </thead> <tbody> <tr> <td>MW-1 (1-1.5)</td> <td>9/17/02</td> <td>1040</td> <td>✓</td> <td></td> <td>✓</td> <td></td> <td></td> <td>2</td> <td rowspan="4">cooler temp 3°C 9/19/02</td> </tr> <tr> <td>MW-2 (1-1.5)</td> <td>9/17/02</td> <td>0800</td> <td>✓</td> <td></td> <td>✓</td> <td></td> <td>2</td> </tr> <tr> <td>MW-3 (1-1.5)</td> <td>9/16/02</td> <td>1445</td> <td>✓</td> <td></td> <td>✓</td> <td></td> <td>2</td> </tr> <tr> <td>TRIP BLANK</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>1</td> </tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> <tr><td> </td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr> </tbody> </table>				Sample Identification	Date Collected	Time Collected	Grab	Composite	Soil	Water	Other	Total # of Containers	Remarks	MW-1 (1-1.5)	9/17/02	1040	✓		✓			2	cooler temp 3°C 9/19/02	MW-2 (1-1.5)	9/17/02	0800	✓		✓		2	MW-3 (1-1.5)	9/16/02	1445	✓		✓		2	TRIP BLANK							1																																																																							4 Total # of Containers		6 Temperature of samples upon receipt (if requested)									
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7 Turnaround Time Requested (TAT) (please circle): <u>Normal</u> Rush (Rush TAT is subject to Lancaster Laboratories approval and surcharge.) Date results are needed: _____ Rush results requested by (please circle): Phone Fax E-mail Phone #: _____ Fax #: _____ E-mail address: _____				<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td>Relinquished by: <u>[Signature]</u></td> <td>Date: <u>9-12-02</u></td> <td>Time: <u>1500</u></td> <td>Received by: <u>[Signature]</u></td> <td>Date: _____</td> <td>Time: _____</td> </tr> <tr> <td>Relinquished by: <u>[Signature]</u></td> <td>Date: <u>9/18/02</u></td> <td>Time: <u>950</u></td> <td>Received by: <u>[Signature]</u></td> <td>Date: <u>9/18/02</u></td> <td>Time: <u>2905</u></td> </tr> <tr> <td>Relinquished by: <u>[Signature]</u></td> <td>Date: <u>9/15/02</u></td> <td>Time: <u>1030</u></td> <td>Received by: _____</td> <td>Date: _____</td> <td>Time: _____</td> </tr> <tr> <td>Relinquished by: _____</td> <td>Date: _____</td> <td>Time: _____</td> <td>Received by: _____</td> <td>Date: _____</td> <td>Time: _____</td> </tr> <tr> <td>Relinquished by: _____</td> <td>Date: _____</td> <td>Time: _____</td> <td>Received by: <u>[Signature]</u></td> <td>Date: <u>9/18/02</u></td> <td>Time: <u>1538</u></td> </tr> </table>										Relinquished by: <u>[Signature]</u>	Date: <u>9-12-02</u>	Time: <u>1500</u>	Received by: <u>[Signature]</u>	Date: _____	Time: _____	Relinquished by: <u>[Signature]</u>	Date: <u>9/18/02</u>	Time: <u>950</u>	Received by: <u>[Signature]</u>	Date: <u>9/18/02</u>	Time: <u>2905</u>	Relinquished by: <u>[Signature]</u>	Date: <u>9/15/02</u>	Time: <u>1030</u>	Received by: _____	Date: _____	Time: _____	Relinquished by: _____	Date: _____	Time: _____	Received by: _____	Date: _____	Time: _____	Relinquished by: _____	Date: _____	Time: _____	Received by: <u>[Signature]</u>	Date: <u>9/18/02</u>	Time: <u>1538</u>																																																																																						
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